



Postdoctoral position - Izabela Sumara lab, IGBMC, Strasbourg, France

Restoring homeostasis of nuclear pore complexes in human disease

Where: A new postdoctoral position is available in the laboratory of Izabela Sumara at the IGBMC in Strasbourg, France:

<https://www.igbmc.fr/en/recherche/teams/cell-cycle-and-ubiquitin-signaling>

The IGBMC is a leading research institution in Europe, currently hosting 46 teams with researchers from around the world. It is a facility-driven institute with state-of-the-art equipment and expertise spanning all experimental techniques relevant to the project. Strasbourg is located in the picturesque wine-growing region of Alsace, close to both Germany and Switzerland. Izabela Sumara's team is internationally recognized for its research on cell biology and the signaling pathways that regulate the cell cycle and nuclear integrity in human cells. These fundamental biological processes are crucial for organismal development, and their dysregulation is linked to many devastating human diseases.

Project: Recent work in the laboratory has identified a novel pathway that drives the spatial assembly and homeostasis of Nuclear Pore Complexes (NPCs) during the G1 phase of the cell cycle. However, it is currently unknown whether and how dysregulation of this pathway may be linked to the development of neurological disorders and cancer. Building on strong existing data and recently developed gene therapy tools, we aim to conduct proof-of-principle research and characterize NPC pathway components in mouse models in the context of neurological disorders and cancer.

How to apply: Applicants should hold a PhD in biology, genetics, or a related field. Experience with mouse models, gene therapy, cell culture, and advanced cell imaging would be an advantage. Motivated, curious, and independent individuals interested in joining the Sumara team in Strasbourg should send a single PDF document to Izabela Sumara at: sumara@igbmc.fr. Please include in this document a cover letter outlining your past and future research interests, a detailed CV, and the contact information of two references.

What we offer: The postdoctoral position is funded by laboratory resources for up to 3 years, but applications for competitive fellowships will be strongly encouraged during the first year. Female scientists are particularly encouraged to apply. Disabled applicants will be given preferential consideration in the case of equivalent qualifications.

Selected lab publications:

Beck J. (2013) *Nature Cell Biology*. Apr 15 (4): 430-9.

Krupina K. (2016) *Developmental Cell*. Jan 11, 36 (1): 63-78.

Agote-Aran A. (2020) *EMBO Journal*. Oct 15; 39 (20): e104467

Sumara I. (2021) *Nature Reviews Molecular Cell Biology*. Oct; 22 (10): 651

Guerber L. (2023) *EMBO Reports*. Jun 5; 24(6):e56241

Liao Y. (2024) *Journal of Cell Biology*. Jul 1; 223(7):e202310006

Lin J. (2024) <https://www.biorxiv.org/content/10.1101/2024.10.08.617205v1>